DARPA BAA 11-14 Q&A

The questions listed below include those posed at the 12 November Industry Day event as those submitted to the BAA email address. Where possible, similar questions have been combined (the text of the original question has been preserved, however) and a single response provided. Questions and responses are grouped into two general categories: Contractual/Programmatic and Technical.

Contractual/Programmatic:

	Question	Response
A	What is the size of the program? Provide your ideas of likely funding levels.	This information will not be provided.
B	Are project reports required to be open literature?	Project reports will not be required to be open literature (i.e., publicly distributed). See BAA, Paragraph 3.5, "Public Release or Dissemination of Information."
C	What are examples of "Other Transactions?	Please see: http://www.darpa.mil/cmo/other_trans.html and http://www.acq.osd.mil/dpap/Docs/otguide.doc
D	Should the Abstract and Proposal only address Phase I? As I understand Phase II and III will be a new BAA. Will the government judge Phase 1 abstracts and proposals on suitability to meet Phase 2 and 3 objectives, or is the Phase 1 proposal evaluation strictly against the Phase 1 objectives?	Proposals will be evaluated for Phase 1 only.
E	Are there secondary metrics not captured in the BAA?	These are up to the proposer. Please refer to the BAA, paragraph 1.2: "Proposals should cite the quantitative and qualitative success criteria that the proposed effort will achieve by the time of each Phase's program metric measurement."
F	What transition opportunities does the customer anticipate?	Though not targeted to a specific program of record, solutions should be applicable to a variety of platforms and missions as described in Appendix 2. There are several DoD communities with transition opportunities.
G	What type of missions/scenarios is ASPN looking for and will they be evaluating on?	See Appendix 2 of the BAA for possible missions/scenarios.
H	Is the cost, schedule, and milestones in abstract (Paragraph 4.4.1.7 of BAA) for Phase 1 only or all phases?	Phase 1 only.
I	Is more than one proposal per group/company allowed?	There is no limit on the number of abstracts that can be submitted.
J	Are foreign institutions allowed to participate as sub-contractors? Is the whole program considered ITAR? - Are foreign nationals at universities allowed to work on this project? If the university is performing fundamental research, are foreign nationals allowed?	Specific technologies developed as part of this program may fall under ITAR restrictions. It the responsibility of the proposer to ensure ITAR compliance.

K	Could you please tell me if there are any publication restrictions for University participant? Do we state explicitly in the abstract. In the past management did not allow us to have prepublication restrictions and we had to give up the involvement. Could you please provide further information about the implications of having universities in the team? How the review of publications would be done? What are the implications of this choice on the funding?	See BAA, Paragraph 3.5for publication restrictions and how they potentially effect university involvement. The review process is described here: http://www.darpa.mil/prc/.
L	Will all the slides be available? May I receive a copy of Ms. Tompkins slide set?	All government slides will be made available on the teaming website described in the Proposers' Day announcement; proposer slides will be posted with permission from the authors.
M	How about SBIR data rights? Is the goal to develop government unlimited rights only?	Any data rights limitations should be set forth in the proposal. See BAA, Paragraph 4.4.1.6 on page 16.
N	Would you have any test data in Phase 1 available for either development or/and evaluation?	Yes.
O	Can a larger group than the assigned representative go into the teaming web site?	Yes.
P	Have seedling efforts been ongoing? If so, with what companies? Was there a seedling done? Could you share who was involved?	No seedling efforts, but there have been 3 SBIR efforts. Please see: http://www.dodsbir.net/selections/abs101/darpaabs101.htm; look for Topic DARPA 10-011.
Q	What do you think about teaming vs. independent submissions?	This is up to the proposer.
R	Regarding the cost information required for the proposal abstract in response to DARPA-BAA-11-14; is a Rough Order of Magnitude (ROM) estimate acceptable for each phase? A firm cost estimate will be extremely difficult to provide by the 11/19/10 due date.	Yes, a ROM estimate is all that is needed.
S	Please advise how I might be able to procure the specifications of BAA 11-14.	The BAA and associated information may be found at: http://www.darpa.mil/sto/solicitations/baa11-14/index.html

Technical

	Question	Response
1	Is the data processing of raw sensor data, e.g. video extraction of landmarks etc. part of the program? Or do we assume the raw information is already processed, e.g. landmark position is provided etc. Is APSN interested in algorithms that are used to generate the measurements (e.g., how to use a LIDAR/camera to generate features; radio sig. to derive RF ranging, etc.), or is the primarily focus on how to fuse measurements that have already been generated? Per the question about whether low-level LIDAR or RF-ranging processing to create the measurements is applicable to this BAA,	Yes, but only in the context of the development of an abstraction layer and/or integration filter. Proposals are evaluated according to the evaluation criteria listed in the BAA; the relative merits of handling "low-level processing" and "high level processing" will depend on what is proposed.

	will the APSN program evaluate proposals that can handle the low-level processing as well as the high-level proc. more favorably?	
2	The BAA says that ASPN algorithms must use at least 10 sensors from the list in the Appendix, but later says the government will provide the test set of data 1 mo prior to the test. Is there any DARPA preference for priority order for sensors to use?	No, we have no preference for priority of sensors.
3	The ASPN BAA mentions processing hardware abstraction as well as sensor abstraction; is this referencing the ability to run the alg. on various types of processors (SBC, FPGA, GPU, DSP, etc.).	Hardware abstraction is not a focus of Phase 1; it is likely to be considered in Phase 2, and will be described in more detail when the Phase 2 BAA is released.
4	If the fusion algorithms take advantage of high-end processors (FPGA, GPU) for increased computational power, will it be scored poorly because it may not run on current single core Single Board Computers? What is the limitation on the computer that runs the software in Phase 1?	There are no restrictions on Phase 1 processing requirements. However, some discussion of the scalability of Phase 1 algorithms and architectures to practical hardware implementations is desired.
5	For sensor Plug and Play, is ASPN primarily focused on how to adapt existing sensors (without vendor help), or is the focus on creating standards for vendors to then follow in the future to support this type of integration?	The intention is not to exclude any sensors, existing or future.
6	Jamming also effects communications capabilities, is this outside the scope of ASPN? To support true plug-and-play across many sensors and platforms, interfaces may need to be wireless (either natively or through a converter) compared to today's traditional hard-lined solutions (serial, 1553, etc.). Is this seen as a focus for ASPN?	Phase 1 solutions should address robustness through losing a sensor, whether this is from jamming or removal of a sensor. Specific communications interfaces are not a focus of Phase 1, but may be so in Phase 2.
7	Do we need to process "raw" data (e.g. video, lidar, sonar, star-gazer) or we be given processed data (e.g. extracted features?)	Raw data – e.g., normal sensor outputs – will be provided, but if you need data either further up the chain (sensor internals) or further down the line (more processed), then those requirements should be described in the proposal. Every attempt will be made to provide data at the requested level of processing.
8	What will the "government-provided optimized navigation solutions" used as a basis of comparison for the performers' solutions look like? What would be used the set the baseline performance as defined in the metric?	At each stage of the test, they will be compared to a statistically-optimized solution for the same combination of sensors at the same location along a route.
9	How important is *multimodal* vs. uni-modal but non-Gaussian?	This depends on the implementation and is therefore left for the proposer to define.
10	What type of noise statistics for sensors need to be considered? What type of non-Gaussian statistics?	Noise statistics associated with the sensors listed in Appendix 2 should be considered.
11	What is the latency requirement for producing a solution? Would the program support CONOPS where the system produces both a less accurate low latency	For Phase 1, the focus should be on meeting the program metrics, but an important outcome of Phase 1 will be

	result for position and orientation and a more accurate higher latency result for position and orientation? Is there a target for time of operations to be completed? (temporally unlimited?). How much latency is allowed?	the resulting latency achieved by the solution. Time of operations could be up to three hours and could occur across multiple environments and scenarios.
12	What does "low-SWaP" mean to the customer? ("Low-SWaP" for a submarine or a ground vehicle probably looks different than "low-SWaP" for a spacecraft.)	The emphasis of Phase 1 is to focus on the software solutions and meeting the metrics.
13	What sensor combinations will the program have?	See Appendix 2 of the BAA for possible sensors.
14	For phase 1 BAA states on page 7: Performance testing will be accomplished in a test-bed that uses both measured and simulated data". Is there an ICD for the test-bed sensors? Will our SW need to run on your e-system? If so what are the system specs?	There will be an ICD for the data interface. Software will not need to run on the government system; performer-provided development hardware and software can interface at that level. However, if desired, a secondary ICD can be provided and solutions may be hosted on the government test-bed hardware.
15	Re: metrics table row 1, page 9 of BAA. We would expect accuracy with respect to an external solution would vary over time, e.g., 99% of the time it's within 10% accuracy, 1% of the time it's within 25%, etc. Is the 10% figure in the table an average?	This is not a go/no-go metric but a goal; Phase 1 accuracy results will be compared to the statistically optimal constrained solution, and deviation from the optimal solution evaluated, with the recognition that some results will vary in relative accuracy with time or other conditions.